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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/534,403

12/19/2005

Oleg Bassovitch

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2873

23713

7590

06/01/2007

GREENLEE WINNER AND SULLIVAN P C

4875 PEARL EAST CIRCLE

SUITE 200

BOULDER, CO 80301

EXAMINER

DIXON, ANNETTE FREDRICKA

ART UNIT

PAPER NUMBER

3771

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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/534,403	<b>Applicant(s)</b> BASSOVITCH, OLEG	
	<b>Examiner</b> Annette F. Dixon	<b>Art Unit</b> 3771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 05 May 2006.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-25 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 May 2005 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>4/14/06 and 5/05/06</u> . | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Drawings***

1. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: device (10). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

### ***Specification***

2. The disclosure is objected to because of the following informalities: On page 4, 10<sup>th</sup> paragraph line 2, "the top wall 15 defining he mixing chamber". Examiner believes the word "he" should be "the". Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1, 2, 6, 7, 9, 10, 15-17, 19, 24, and 25 are rejected under 35 U.S.C. 102(b) as being anticipated by Michielsen (3,575,167).

As to Claim 1, Michielsen discloses a breathing apparatus for providing rebreathable air mixture expired by a user which air mixture has a lower oxygen concentration than the ambient air, said apparatus comprising: an expiratory path (34) said expiratory path (34) communicating with a reservoir (42), an inspiratory path (38) communicating with said reservoir (42) through a carbon dioxide adsorption chamber (17), a directional valve (Figure 1) in each of said expiratory path (34) and said inspiratory path (38); and a means of communication of said expiratory path and said inspiratory path in sealed engagement with the respiratory system of a user (32). (Figure 1).

As to Claims 2, 24, and 25, Michielsen discloses the volume of the reservoir (42) may be varied by compression of the reservoir (42).

As to Claims 6, 7, 9, 10, Michielsen discloses the reservoir (42) enables the oxygen content to be adjusted by the mixing of air within the reservoir (42).

As to Claims 15 and 16, Michielsen disclose the use of a demand valve (Figure 1) in communication with the inspiratory path.

As to Claim 17, Michielsen discloses the reservoir (42) is positioned below the carbon dioxide adsorption chamber (17).

As to Claim 19, Michielsen discloses the reservoir is disposable (Column 8, Lines 15-33).

***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

7. Claims 3-5, 8, 11, 12-14, 18, 20, 22, and 23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Michielsen (3,575,167) in view of Lewis et al. (4,764,346).

As to Claims 3-5, Michielsen discloses a breathing apparatus comprising all the recited elements, yet does not expressly disclose the reservoir placed inside a chamber. However at the time the invention was made the use of a chamber to protect the reservoir was well known. Specifically, Lewis discloses a flexible membrane containing purified air being housed inside a chamber for the purpose of enabling the amount of medicament to be delivered to the patient to be specifically monitored enabling efficient

rebreathing (Column 2 Lines 45-53). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the device of Michielsen to be placed inside a chamber, as taught by Lewis to enable efficient rebreathing and thereby enabling the compression cycle to be automated.

As to Claims 8 and 11, Michielsen discloses the reservoir (42) enables the oxygen content to be adjusted by the mixing of air within the reservoir (42).

As to Claims 12-14, Michielsen discloses a breathing apparatus comprising all the recited elements, yet does not expressly disclose the use of apertures for communicating through the sidewall between said absorptive chamber and adjacent to the sidewall and a flexible material for the reservoir. However, at the time the invention was made the use of apertures was well known. Specifically Lewis teaches the use of apertures (25a) for the purpose of maintaining the pressure within the flexible reservoir. (Figure 4 and Column 2). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the device of Michielsen to include the apertures (25a), as taught by Lewis for the purpose of maintaining pressure within the system.

As to Claim 18, Michielsen discloses the reservoir (42) is positioned below the carbon dioxide adsorption chamber (17).

As to Claim 20, Michielsen discloses the reservoir is disposable (Column 8, Lines 15-33).

As to Claim 22, Michielsen discloses a breathing apparatus comprising all the recited elements, yet does not expressly disclose the carbon dioxide adsorption

chamber is located within a canister and is replaceable. However, at the time the invention was made the use of carbon dioxide adsorption chamber having a canister was well known. Specifically Lewis discloses a disposable canister having the carbon dioxide adsorption chamber therein for the purpose of preventing patient contamination. (Figure 4 and Abstract). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to provide a disposable canister, as taught by Lewis to prevent contamination and the need for sterilization

As to Claim 23, Michielsen discloses a breathing apparatus comprising all the recited elements, yet does not expressly a constant volume of the reservoir. However, at the time the invention was made the ability to maintain a constant volume was well known. Specifically, Lewis discloses the use of gas inlet line (26) to enable the volume of the reservoir to be maintained by providing additional gas for anesthesia. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to include the pressurized line, as taught by Lewis to enable additional additives to be provided to the patient.

8. Claim 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Michielsen (3,575,167) in view of Smith (6,536,430).

As to Claim 21, Michielsen discloses all the recited elements, yet does not expressly discloses the use of an oxygen analyzer within the inspiratory path. However, at the time the invention was made the use of an oxygen analyzer was well known in rebreathing devices. Specifically, Smith discloses the use of an oxygen analyzer (14) for

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the purpose of ensuring the patient is receiving sufficient oxygen and the rebreathing device is functioning properly. (Column 4, Lines 43-50). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the device of Michielsen to include an oxygen analyzer, as taught by Smith to ensure proper patient ventilation.

### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Bartos (4,409,978); Takoaka (3,612,048); Kanwisher (3,556,098); and

Behnke (4,502,876)

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Annette F. Dixon whose telephone number is (571) 272-3392. The examiner can normally be reached on Monday thru Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Justine Yu can be reached on (571) 272-4835. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.




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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. zStatus information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Annette F Dixon  
Examiner  
Art Unit 3771



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5/23/07